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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/067,680	02/04/2002	Tsung-Pei Chiang	B-4493 619511-2	7127

7590 02/08/2006

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EXAMINER

NGUYEN, KEVIN M

ART UNIT PAPER NUMBER

2674

DATE MAILED: 02/08/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/067,680

Applicant(s)

CHIANG ET AL.

Examiner

Kevin M. Nguyen

Art Unit

2629

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 15 December 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 12-14, 16 and 17 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 12-14, 16 and 17 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 04 February 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
- ☒ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Request for Continued Examination

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 12/15/2005 has been entered. An action on the RCE follows:

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claim 13 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

4. Claim 13 recites the limitation "the first mode or the second mode" in line 5.

There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States

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only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

6. Claims 12 and 14 are rejected under 35 U.S.C. 102(e) as being anticipated by Moriyama (US 6,624,801).

7. As to claim 12, Moriyama teaches a driving method for a Thin Film Transistor (TFT) array [TFT array 20, see Fig. 1A], capable of saving power [see col. 16, lines 44-45], comprising:

dividing a Thin Film Transistor array frame [TFT array 20, see Fig. 1A, col. 8, lines 45-52] into a first zone and a second zone [a first display region 31 and a second display region 32, see Fig. 4];

driving the first and second zones respectively with line inversion and frame inversion [the first display region 31 employs the row line inversion drive, and the second display region 32 employs the frame inversion driver, see Figs. 3A and 4, col. 16, lines 33-35].

8. As to claim 14, Moriyama teaches further comprising grouping the first and second zones grouped into a graphic and non-graphic regions respectively [the second display region 32 is displayed picture/graphic, see col. 10, lines 4-5; the first display region 31 is displayed a battery remaining/non-graphic, see col. 9, lines 57-67].

Claim Rejections - 35 USC § 103

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

10. Claims 13, 16 and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Moriyama in view of Kubota et al (US 6,778,160).

11. As to claim 13, Moriyama teaches further comprising choosing the first mode or the second mode [a switch 42 is mounted between the two scanning lines Gn-1, Gn corresponding to a boundary between the first display region 31 and the second display region 32, in the shift register 40, see col. 16, lines 61-67];

Moriyama teaches all of the claimed limitation, except for implementing an Application Specific Integrated Circuit chip.

However, Kubota teaches a related TFT-LCD which includes Application Specific Integrated Circuit chip 21, see Fig. 1, col. 7, lines 2-5.

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to implement the Application Specific Integrated Circuit chip 21 as taught by Kubota in the LCD device of Moriyama in order to achieve the benefit of intend to drive the LDC device, because this would provide a logic units such as a supplementary correction portion 25 for performing a supplementary correction (see Kubota, col. 7, lines 4-5).

12. As to claim 16, Moriyama teaches a LCD display [a LCD device, see col. 8, lines 43-45], comprising:

driver circuit determining into a first and second driving types [a shift register 40 drives the first display region 31 and the second display region 32, see Figs. 3A and 4, col. 16, lines 33-35];

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a Thin Film Transistor array [TFT array 20, see Fig. 1A, col. 8, lines 45-52],
comprising:

a first zone driven with line inversion, a second zone driven with frame inversion
[the first display region 31 employs the row line inversion drive, and the second display
region 32 employs the frame inversion driver, see Figs. 3A and 4, col. 16, lines 33-35].

Accordingly, Moriyama teaches all of the claimed limitation, except for
implementing an Application Specific Integrated Circuit chip.

However, Kubota teaches a related TFT-LCD which includes Application Specific
Integrated Circuit chip 21, see Fig. 1, col. 7, lines 2-5.

It would have been obvious to a person of ordinary skill in the art at the time the
invention was made to implement the Application Specific Integrated Circuit chip 21 as
taught by Kubota in the LCD device of Moriyama in order to achieve the benefit of
intend to drive the LDC device, because this would provide a logic units such as a
supplementary correction portion 25 for performing a supplementary correction (see
Kubota, col. 7, lines 4-5).

13. As to claim 17, Moriyama teaches further comprising grouping the first and
second zones grouped into a graphic and non-graphic regions respectively [the second
display region 32 is displayed picture/graphic, see col. 10, lines 4-5; the first display
region 31 is displayed a battery remaining/non-graphic, see col. 9, lines 57-67].

Response to Arguments

14. Applicant's arguments with respect to claims 12-14, 16 and 17 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

15. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kevin M. Nguyen whose telephone number is 571-272-7697. The examiner can normally be reached on MON-THU from 8:00-6:00 pm.

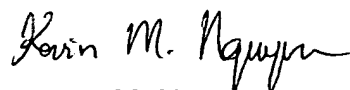
If attempts to reach the examiner by telephone are unsuccessful, Patrick N. Edouard who is a supervisor Division 2629 can be reached on 571-272-7603. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8000.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the Patent Application Information Retrieval system, see <http://portal.uspto.gov/external/portal/pair>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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A handwritten signature in black ink, appearing to read "Kevin M. Nguyen". The signature is fluid and cursive, with the first name "Kevin" and last name "Nguyen" clearly distinguishable.

Kevin M. Nguyen
Patent Examiner
Division 2629

KMN

February 2, 2006